

# PATENT COOPERATION TREATY

From the  
INTERNATIONAL PRELIMINARY EXAMINING AUTHORITY

PCT

To:

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SERVICE BREVETS & CONTRATS

Reçu  
le

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WRITTEN OPINION

(PCT Rule 66)

5 May 04 (n)

Date of mailing  
(day/month/year)

05.04.2004

Applicant's or agent's file reference  
WO 21.1018

SRPC - Clamart

REPLY DUE

within 1 month(s)  
from the above date of mailing

International application No.  
PCT/EP 02/14822

International filing date (day/month/year)  
20.12.2002

Priority date (day/month/year)  
11.01.2002

International Patent Classification (IPC) or both national classification and IPC  
G01N27/22

Applicant  
SERVICES PETROLIERS SCHLUMBERGER

1. This written opinion is the **second** drawn up by this International Preliminary Examining Authority.
2. This opinion contains indications relating to the following items:
  - I ☒ Basis of the opinion
  - II ☐ Priority
  - III ☐ Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
  - IV ☐ Lack of unity of invention
  - V ☒ Reasoned statement under Rule 66.2(a)(ii) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
  - VI ☐ Certain documents cited
  - VII ☐ Certain defects in the international application
  - VIII ☐ Certain observations on the international application
3. The applicant is hereby **invited to reply** to this opinion.
 

**When?** See the time limit indicated above. The applicant may, before the expiration of that time limit, request this Authority to grant an extension, see Rule 66.2(d).

**How?** By submitting a written reply, accompanied, where appropriate, by amendments, according to Rule 66.3. For the form and the language of the amendments, see Rules 66.8 and 66.9.

**Also:** For an additional opportunity to submit amendments, see Rule 66.4.  
For the examiner's obligation to consider amendments and/or arguments, see Rule 66.4 bis.  
For an informal communication with the examiner, see Rule 66.6.

If no reply is filed, the international preliminary examination report will be established on the basis of this opinion.
4. The final date by which the international preliminary examination report must be established according to Rule 69.2 is: 11.05.2004

Name and mailing address of the international preliminary examining authority:



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**I. Basis of the opinion**

1. With regard to the **elements** of the international application (*Replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this opinion as "originally filed"*):

**Description, Pages**

1-6 as originally filed

**Claims, Numbers**

1-11 as originally filed

**Drawings, Sheets**

1/1 as originally filed

2. With regard to the **language**, all the elements marked above were available or furnished to this Authority in the language in which the international application was filed, unless otherwise indicated under this item.

These elements were available or furnished to this Authority in the following language: , which is:

- ☐ the language of a translation furnished for the purposes of the international search (under Rule 23.1(b)).
- ☐ the language of publication of the international application (under Rule 48.3(b)).
- ☐ the language of a translation furnished for the purposes of international preliminary examination (under Rule 55.2 and/or 55.3).

3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, the international preliminary examination was carried out on the basis of the sequence listing:

- ☐ contained in the international application in written form.
- ☐ filed together with the international application in computer readable form.
- ☐ furnished subsequently to this Authority in written form.
- ☐ furnished subsequently to this Authority in computer readable form.
- ☐ The statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.
- ☐ The statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished.

4. The amendments have resulted in the cancellation of:

- ☐ the description, pages:
- ☐ the claims, Nos.:
- ☐ the drawings, sheets:

5. ☐ This opinion has been established as if (some of) the amendments had not been made, since they have been considered to go beyond the disclosure as filed (Rule 70.2(c)).

6. Additional observations, if necessary:

**V. Reasoned statement under Rule 66.2(a)(ii) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement****1. Statement**

Novelty (N)	Claims	1,11
Inventive step (IS)	Claims	8,9
Industrial applicability (IA)	Claims	

**2. Citations and explanations****see separate sheet**

**Re Item V**

**Reasoned statement under Rule 66.2(a)(ii) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement**

Reference is made to the following documents:

- D1: EP-A-0 308 004 (SCHLUMBERGER PROSPECTION ;SCHLUMBERGER LTD (NL)) 22 March 1989 (1989-03-22)
- D2: PATENT ABSTRACTS OF JAPAN vol. 1999, no. 08, 30 June 1999 (1999-06-30) & JP 11 064067 A (SEKIYU KODAN;NKK CORP; SEKIYU SHIGEN KAIHATSU KK; TEIKOKU SEKIYU KK; Y), 5 March 1999 (1999-03-05)
- D3: WO 00 45133 A (ASPELUND AUDUN ;WIDEROEE TOR (US)) 3 August 2000 (2000-08-03)

**Article 6 PCT**

Prior to assessing novelty, inventive step and industrial applicability of the claimed subject-matter, it is noted that the sole independent claim is unclear in the sense of article 6 PCT. The assessment has been made, and is therefore conditional to, an interpretation of the claim which is based on the description. The point in which the claim lacks clarity is the following:

Claim 1 refers to "...an internal diameter substantially equal to that of the tubing(10).." implying that the diameter can somehow depart from being equal to the internal diameter of the tubing (10). According to the applicants description in particular on page 3 line 32-page 4 line 1 the tube section (14) has a cylindrical shape and its internal diameter is the same as that of the tubing (10).

In order to remove this ambiguity, the applicant is requested to bring the wording of the claims into conformity with the description as originally filed.

**Novelty Article 33(2) PCT**

1.Document D1 which is considered to represent the closest prior art discloses the aspects of claims 1 and 11:

-A device for integrating electrodes for characterising the flow of a multiphase fluid into a tubing through which the fluid flows comprising a tube section made from an electrically insulating material (Page 5 line 9) having an internal diameter substantially equal to that of the tubing said tube section being integrated into the tubing and bearing the electrodes on its external surface (cf, D1 Fig 1 and Page 3 lines 14-18). Hence claims 1 and 11 lack novelty in the sense of Article 33(2) PCT.

**Inventivity Article 33(3) PCT**

1.2 The feature of claim 8 whereby the junction between the two sections of tubing is threaded or welded is merely one of several straightforward possibilities from which the skilled person would select, in accordance with circumstances, without the exercise of inventive skill, in order to solve the problem posed.

1.3 The feature of claim 9 whereby a mixing system such as a venturi (applicants desc Page 6 line 19-20) is incorporated upstream of the measuring system is also one of several straightforward possibilities from which the skilled person would select, in accordance with circumstances, without the exercise of inventive skill, in order to solve the problem posed, as is disclosed in document D2 JP11064067 (cf, Fig1 #52).

2. It is not at present apparent to the examining division which part of the application could serve as a basis for a new independent claim which meets the requirements of Article 33(1) PCT regarding novelty and inventive step. Should the applicant nevertheless regard some particular matter as new and inventive, an independent claim should be filed taking account of Rules 6.3 PCT. The applicant should indicate in the letter of reply the difference of the subject-matter of the new claim vis-a-vis the state of the art and the inventive significance thereof. Finally, in amending claims and description, the applicant should heed Art. 19(2) PCT, regarding added subject-matter.